

AN INVESTIGATION INTO THE TEACHER EDUCATORS' ATTITUDE
TOWARDS PRACTICE TEACHING IN SOME OF THE SELECTED
TRAINING COLLEGES OF U.P. AND DELHI

By

V.P. SHARMA

Advisory Committee

Shri B.N. Pandey (Adviser)

Dr. S.S. Kulkarni (Member)

Dr. R.P. Singh (Member)

Submitted in part fulfillment of the requirements for
the Associateship of the National Institute of Educa-
tion, New Delhi

1967-68

ACKNOWLEDGEMENT

The author wishes to thank sincerely
Shri B.N. Pandey, of the Department of Teacher Education,
National Institute of Education, for his valuable
guidance and suggestions during the course of this study.

In no small measure his thanks go to Dr. S.S.
Kulkarni and Dr. R.P. Singh respectively of the Departments
of Psychological Foundations and Comparative Education
of the National Institute of Education for their guidance
and suggestions in the completion of this study.

The author is also grateful to all his friends
and associates who helped him directly and indirectly in
the present study.

V.P. Sharma

CONTENTS

	Page
Chapter I	1
a) Introduction to the Problem	1
b) The Need of the Problem	2
c) Statement of the Problem	3
d) Scope and Delimitation of the Problem	4
e) Related Studies	4
f) Scope and Meaning of the Major Terms used in the Study	10
g) Objectives of the Study	13
Chapter II : The Place of Teacher Education and Its Philosophy	14
a) Prevalent State of Practice Teaching and its Place in Teacher Education	15
Chapter III : Attitude and Their Measurement	20
a) Measurement of Attitude: Necessity	21
b) Method of Attitude Measurement	23
c) Procedure of the Study	24
Chapter IV : Analysis and Interpretation of Data	34
Chapter V : Conclusions and Suggestions	44
Bibliography	46
SUMMARY	
Appendix I : Attitude Questionnaire given for Try-out	
Appendix II: The Final Attitude Scale	
Appendix III:List of Institutions Covered under the Study	
Appendix IV :List of Tables	

CHAPTER I

Introduction to the Problem:

In any system of education, the teacher holds the pivotal position. In spite of the fact that technological advancements have made headway in the process of teaching-learning, it has not been found possible to replace the teacher from the scene. Teaching machines are doing good service, but still there are many classroom situations where the teacher is needed indispensably.

Formerly we have had the conviction that teachers are born and not made. But this statement does not hold good for our present day educational needs. With the rapid growth in the ^{number of} consumers of all levels of education, specially the first and the second levels, it is necessary to make provision for the training of teachers who are to assume the task of teaching in the schools. This education of teachers is a stupendous task, both qualitatively and quantitatively. One must remember that it is on the quality of teachers that the excellence of a country's citizenry depends in all walks of life. The importance and education of the teacher could be neglected only at the cost of national peril. Most advanced countries of the world like U.S.A., U.K. and the U.S.S.R. have added a year or two to the teachers professional preparation. It indicates that these countries also value the education of teachers. The same should happen in India so that some improvement in teacher education may be possible.

✓ In the training of teachers, the role played by teacher educators is of paramount significance. The period of stay in a teachers college has some impact upon the prospective teachers. The methods of teaching adopted by the teacher educators; their

habits of work; their attitude towards the work done therein and the interests shown by them, are all bound to have the influence upon the teacher's professional preparation. We assume that the training of the teachers is bound to bring about some change in their attitude towards the type of work to be undertaken by them in future. It is universally accepted that the practical experience of a teacher under training play a key role in his preparation for work. Here it was felt that teacher educators attitude towards this aspect of work would be significant. Hence the investigator felt the need of undertaking this problem.

The Need of the Problem:

The author experienced about the condition of practice teaching in a teachers' college and felt that practice teaching is done in a perfunctory manner and the teacher educators are following the same old methods of teaching. Students in a teachers' college also think it a routine matter and do not take any particular interest. Really the work of practice teaching should give them a command over teaching skills and techniques. This problem is related to the attitude which is generally held by the teacher educator which in turn affects the performance of their own and also that of their student teachers undergoing the training.

The study of this attitude is important from another point of view. Education and training have a definite role in forming the right type of attitude. If we know the existing attitudes of a group of people pursuing a particular job, we can bring about some modification or changes in their attitudes through specific activities.

In a teacher education programme the backbone is the student teaching. Regarding the need and importance of the problem the following quotation would not be out of place to mention:

"Professional educators and students alike have come to realize the value and importance of the student teaching programme in the preparation of prospective teachers. From the expectation of the past that student teaching experience would produce a skilled teacher, educators have moved to the realization that this is more nearly a period of re-orientation. A polished performer can not be developed during this short span of time but a high state of readiness for on the job experience can certainly be created".¹

So far no attention was paid to the training of teacher educators. Only the in-service education of teachers in schools was supposed to be essential and undertaken accordingly. But such a state of affairs could not continue and efforts have been made to improve the situation. Writing in a recent issue of the Times Educational Supplement, a correspondent complained that the methods used in the Training Colleges in England were the same as used in 1880. Teachers through their effective skill must prove that teaching demands special skills and knowledge.

Statement of the Problem:

The problem studied is "A Study of Teacher Educators" Attitude towards Practice-teaching in some of the selected Training Colleges of U.P. and Delhi." It/^{mainly} aims at finding out the existing

1. Woodruff, Asahel D.: Student Teaching To day (Washington D.C.: The American Association of Colleges for Teacher Education 1960) p. 50.

attitude of men and women, working in the teachers college, towards practice teaching programme of the college.

Scope and Delimitation of the Problem:

The present study has been delimited by studying attitude not towards the entire programme, but only towards supervised school experience under which each prospective teacher remains for sometime. Only the staff of the secondary training college has been included with only those teachers who teach the non-practical subjects. It also does not include the primary/^{school} teacher educators. The same study can be undertaken for the whole nation and for teacher educators at different levels of teacher training. The study undertaken does not include the practice teaching done by arts and crafts teachers. Basic training schools and colleges have been omitted.

Related Studies:

A serious study of related literature on the topic is necessary to arrive at some problems which can be further probed. The investigator searched for the related literature on the topic and he came across many studies which relates to the study of student teachers' attitude towards courses in education, practice teaching etc. Similarly in some studies attempts have been made to study the attitude of teachers towards innovations in education, educational practices and other factors concerned with the process of education.

The study of attitude has become a popular and important topic not only in social psychology but also in education, guidance

and counselling. There is vast literature in journals of psychology, sociology, education and political science dealing with attitude.²

The author consulted a few studies relating to his field of investigation. In the Central Institute of Education Delhi Shri S.S.L. Agrwal,³ conducted a study on the Attitude of Training/ College Teachers.

The study was restricted to a smaller area. Teachers having a minimum teaching experience of two years were included. Only a few factors such as age, sex, designation, professional, qualification and teaching experience have been analysed. No attempt was made to find out the ways and means for making attitudes more favourable towards the profession. The Likert-type of attitude scale was employed for the purpose of the study. The study was further limited to find out only the current attitude of the teachers concerned.

The following are some specific problems on which the study mainly focussed its attention.

1. To find out the reaction of training college personnel to the immediate problem concerning them in the profession. This includes the problem associated with their social status, academic freedom, salary and adjustment with the institution.

2. To know whether they have any faith in the utility of teacher education (both pre-service and in-service) or they are serving perfunctorily.

2. Edward, A.L. Techniques of Attitude Scale Construction* Appleton Century Crafts Inc. New York, 1957.

3. Agrwal, S.S.L. Attitude of Training College Teachers of Agra University towards their profession*. C.I.E. Delhi University Campus, Delhi Unpublished M.Ed. Dissertation, 1965-66.

3. To find out their academic and professional qualifications in relation to the school subjects they are supervising and guiding and the papers they are teaching.

4. To know their attitudes towards the career and ultimately to estimate the degree of their adjustment to the teaching profession in a training college.

Hypothesis:

He starts with the hypothesis that the attitude formation is a function of age, sex, designation, professional qualification and teaching experience.

Conclusion from the Study:

1. The attitude of the Principals of Training Colleges and Head of the Department of Education is a little more favourable as compared to the lecturers therein.

2. The attitude of male teachers appears to be somewhat more favourable than female teachers. Further, it is revealed that the difference is not significant and the attitude towards profession is independent of sex.

3. The age factor has no significant bearing on their attitude towards the profession. They are independent of each other.

4. The attitude of training college teachers under study is independent of their professional qualification.

In another study not so much related to the author's field of investigation Shri Om Datt tried to know the attitude of school

teachers⁴. He made a comprehensive study. Likert technique of attitude scale construction was employed. In the beginning an opinionnaire containing 60 statements was issued to 300 teachers and scored as per Likert's method of five point scale. Item analysis was done and 't' value for each item was calculated. Only 30 items were retained which showed discrimination between the upper and the lower group.

The important findings from the study are:

1. Most of the secondary school teachers in Delhi have favourable attitude towards their profession.

2. The attitude towards the profession is not influenced by factors like teaching experience, age, marital status and undertaking of the extra work.

3. The attitude of teachers towards the profession is favourable in the following categories:

- (a) Those who are satisfied in the profession
- (b) Those who have willingly joined the profession
- (c) Women teachers.

Evan⁵ conducted "A study of attitude towards teaching as a career" and revealed very interesting conclusions. The subjects of her study were school certificate candidates. The important conclusions drawn by her are:

- (1) That there is no significant difference between scores

4. Om Datt, "A Study of Attitude of Teachers of Secondary Schools in Delhi towards their Profession", C.I.E. Delhi, 1963, Unpublished M.Ed. Dissertation.

5. Evan K.M., "A Study of Attitude towards Teaching as a Career", Br. Jr. Edu. Psy. Vol. XXII, 1952, P. 13.

on attitude test given to boys and girls.

(ii) The difference again is not significant in attitude scores of pupils in different schools, or in different parts of the country.

(iii) The significant and negative correlation exists between the school certificate examination and the attitude test.

(iv) Intelligence and attitude scores have no significant correlation.

In another study Edra E. Lipscomb⁶ investigated the attitude of student teachers in elementary education. The basic problem was to explore their attitude before and after their student teaching experience in a effort to determine whether attitudinal changes has occurred.

The sample consisted of forty four senior students enrolled as student teachers in elementary education at Indiana University.

A situational type of teacher attitude scale was developed and validated, and the reliability co-efficient of .80 was established. The test was administered to the student teachers at the beginning and again at the end of their student teaching.

The data was analysed using chi-square and the Mc Nemar test for the significance of change in the expressed attitude of student teachers.

6. Lipscomb, Edra E. "A Study of the Attitudes of Student Teachers in Elementary Education"., The Journal of Educational Research, Vol. 60, No.4, December, 1966.

Conclusions from the Study

1. That the Lipscomb scale of teacher attitude appears to have reasonable validity and reliability for the measurement of expressed teacher attitude.

2. Significant changes occur in the expressed attitude of student teachers during their student teaching experience. This was found to be true at better than the .001 level of confidence.

Another study entitled "A Comparative Study of the West African Students and Teachers towards modern approach in Teaching" was conducted by Oscar Ferson⁷. Two experiments were conducted in order to determine the facility with which attitudes of West African students and teachers towards the modern approach in teaching can be expected to change. The first experiment involved teachers belonging to two different regions and their attitude towards modern approach in teaching was measured by the Likert-type of attitude scale and compared. A statistically significant favourable difference was found between their responses and those of all other groups with whom they were compared.

A few related studies are mentioned here only with their title and the author:

1. Kissach, M. (1956) "The Attitudes of Training College Students towards Corporal Punishment" University of Manchester, Department of Education, Unpublished M.Ed. Thesis.
2. Singh, Harbhajan L. (Mrs.) "An investigation into the Attitudes of Training College Lecturers towards Extension Services Departments, Unpublished M.Ed. Dissertation, CIE Delhi, 1965-66."

7. Ferson Oscar, "A Comparative Study of the West African Students and Teachers towards Modern Approach in Teaching", The British Journal of Educational Psychology, Nov. 1965 Vol. XXXV Part 3.

3. Azad J.L.M. "A general survey of the attitudes of Delhi teachers towards the socio-economic and professional aspect of their lives" Unpublished M.Ed. Report, C.I.E. Delhi, 1954.
4. Raina T.N. "Construction of the attitude scale for measuring the attitude of school teachers towards teaching as a profession" Unpublished M.Ed. Report, C.I.E. Delhi, 1954.

After considering these studies the investigator knew about the methodology adopted and their limitations. He could think over some aspects of the problem which can be undertaken for further investigation. Thus he undertook the present investigation and decided its methodology and scope.

Scope and Meaning of the Major Terms used in the Study

Practice Teaching:

Ordinarily the practice teaching is understood as the delivery of some lessons by the trainee in a school under the supervision of his college teacher. The scope and meaning of practical work is comprehensively stated by the Study Group on the Education of Secondary Teachers in India⁸ as follows:

1. Practice teaching
2. Observation of pupils and lessons
3. Criticism lessons
4. Study of different types and grades of schools
5. Organization of and participation in co-curricular activities

8. The All India Association of Teacher Educators: Baroda Study Group on the Study of Secondary Teachers 1964.

6. Follow up of assignments given to school children
7. Preparation of case studies
8. Construction and administration of scholastic achievement test
9. Black Board work
10. Sociometric study of groups in the class room
11. Preparation and use of audio-visual aids by students as well as simple workshop practice
12. Practical work connected with school subjects
13. It is meant to take care of deficiencies in the trainee's knowledge of the school subject, he/she proposes to teach from the point of view of the needs of the school.

The scope of student teaching⁹ is further described as follows:

1. Observation of pupils and their characteristic behaviour
2. Observation of good lessons
3. Class teaching including the use of the new methods
4. Organizing and guiding practical work in the field, laboratory and workshop
5. Planning for the equipment in a department or laboratory and maintaining the service of its facilities to students
6. Critical study of various school services and planning to improve them.
7. Preparation and use of audio-visual aids
8. Maintaining cumulative records, conducting case studies and using sociometric techniques
9. Planning, challenging assignments and attending to correction work
10. Developing tests and other evaluation procedure to test achievement in a unit or topic

9. Sharma, P.D. 'Objectives and Scope of Student Teaching', Report of the All India Preparatory Seminar held at Allahabad from Dec. 15 to 20, 1966, p.33, Department of Teacher Education (NCERT), 33, Chhatra Marg, Delhi-7.

11. Participation in school assemblies important events or days, staff meetings
12. Induction into the organization of the school, its office and departments
13. Studying resources in the community and utilizing the same for strengthening the class teaching and other school programmes
14. Using proformas for self-assessment and progress gained

Student Teaching

Student teaching is a comprehensive plan according to these two frameworks suggested. In this way, the student teaching includes not only those skills and techniques which are required for class room teaching but many other things must be made known to the teacher during his course of training.

Teacher Educators

Teacher training involves the consideration of two things. Imparting the knowledge of the subject matter to the teachers and teaching them about the pedagogical aspects associated with the teaching-learning process. About the former the teachers' college generally do not assume any responsibility but about the latter they are supposed to direct and instruct fully the prospective teachers. A teacher educator should generally have teaching experience in a school and after acquainting him with all aspects of teaching there/^{he}should go to teach in a college of education. He should also have some experience of supervision and inspection so that he can have some idea of the difficulties met by the teachers. He should have high professional training such as

Master's degree in education followed by a doctorate degree in education. Here only those teacher educators have been included who are associated with the teaching of the methodology of subjects like English, Hindi, Mathematics, Science, Geography, History etc. etc.

Objectives of the Study

- 1) To find out in general the attitude of teacher educators towards practice teaching.
- 2) To ascertain whether teacher educators attitude towards practice teaching differs with their experience, qualifications and the type of institution to which they belong.

CHAPTER II

The Place of Teacher Education and its Philosophy

Teacher education occupies a unique place in the entire system of education. Its importance can not be underestimated because the quality of a teacher in turn affects the school education. "Investment in teacher-education can yield very rich dividends because the financial resources required are small when measured against the resulting improvement in the education of millions"¹. A teacher should be exposed to many innovations in the techniques of teaching so that he can adopt them successfully. In the absence of such a training, he tends to perpetuate the traditional method of teaching and this way does not enlighten the minds of his pupils, but loads it ^{with} what White-head has called as 'dead bits' of knowledge. The change in the use of the phrase 'Teacher Training' to 'Teacher Education' indicates the philosophy of teacher education and ^a ⁱⁿ ^{is needed} change/it/according to the needs of the society. A teacher is not only supposed to know about the various skills and tricks of the trade in teaching, but he should also have certain desirable interests and favourable attitudes towards his work. In this way he can lead the groups of students successfully under his guidance. The teacher education programme gives them much freedom for experimentation and educates them for the development of the total personality. Every aspect of the training programme should be planned according to their abilities, interests and needs. In every aspect of teacher education we must be careful about being democratic for example in evaluation, organization of

1. Report of the Indian Education Commission 1964-66, p. 67.

co-curricular activities and the curriculum, in leading the corporate and community life and also in practice teaching. It goes without saying that the way in which we try to develop the personality of prospective teachers, it will have its effects upon those who would be taught in the schools by these teachers. Hence we must be quite reasonable and careful while devising programmes for the education of prospective teachers.

For educational improvement and reconstruction, both the pre-service and inservice education of teachers play a critical and crucial role. In the pre-service programmes, the crux of the matter is student teaching. Hence efforts will have to be made for strengthening and enriching the teacher education programme for turning out effective teachers.

Prevalent State of Practice Teaching and its place in Teacher Education

Practice teaching should be regarded as an integral part of teacher education. Without it a prospective teacher can not acquire the skills of teaching. He can see that how the laws and methods learned about teaching can be applied in the class room situation. Under present circumstances, observed the Indian Education Commission that "set patterns and rigid techniques are followed in practice teaching with a disregard for present day needs and objectives"²,

There are some important aspects of practice teaching about which there is no agreement among the experts. In a

2. Opt. cit. p. 33. 14.

seminar on student teaching and evaluation, it was reported that "There is no agreement, for instance, on the number of lessons which will prove adequate in preparing teachers, in what way lessons should be planned, whether all, most or only a few should be checked by subject lecturers, before delivery, what percentage of lessons should be supervised and by whom or what kind and number of visual aids should be used for any given age-group"³.

Besides this, there are two other important aspects of student teaching which requires immediate attention. It appears essential that cooperation of schools and the class room teacher should be readily available for the training institutions so that the efficiency and the usefulness of student teaching programme can be enhanced. Secondly the evaluation of student teaching should be done in view of the objectives decided for the purpose.

Student teachers regard it as something unnecessary and a wastage of time. They have no faith in the effectiveness of the method learnt in the training colleges. As they come out of the training institutions, the same traditional methods are followed by them while teaching in the schools.

The same appears true about the teacher educators. Many of them are appointed without experience of school teaching. Their perception about the preparation of a prospective teacher is poor because they do not have teaching experience and are quite ignorant about many class room situations faced by a teacher while teaching. The problem of training teachers involves the cooperation of the

3. Opt. cit. p. 11.

school and teacher training institutions. As Dr. Conant has stated "Before being ^{entru}interested with complete control of a public school classroom, a teacher should have had opportunities under close guidance and supervision actually to teach"⁴. This close guidance and supervision is not possible without the help of the school/teacher. Very few teachers in our schools are capable of supervising the lessons given by prospective teachers.

As regards practice teaching such as sorry state of affairs is obtaining at present in this country. There is little cooperation between the school and the training colleges. The Head of a teachers' college is always worried about the placement of his students for practice teaching. Only in schools where he can exercise his personal influence students teachers are allowed for practice teaching. Otherwise they are just tolerated and not welcomed. The teachers have the common notion that a lot of time is wasted as a result of formal teaching by the student teachers. This condition obtains because the school teachers and headmasters are not consulted regarding the organization ^{of} and coverage under practice teaching. It does not fulfill the needs of the school. Generally, the schools are also ill-equipped as regards the teaching aids and materials are concerned; hence much difficulty is experienced by student teachers while undergoing the training.

It is sure that the attitude of school teachers towards practice teaching depends upon the regard in which it is viewed

4. Quoted in the Indiana State University Teacher College Journal Vol. 39, No.1, Oct. 1967, p.30.

or held by the college and the school administration's concern about the preparation of the prospective teacher. In most of the colleges the scheme of lesson planning remains unchanged except some efforts to introduce the unit method of lesson planning in the regional colleges of education under the NCERT.

For real improvement in teacher education, it is quite necessary to have a higher level of preparation for the classroom teacher who will guide and shape the experience of the student teachers. Similarly, we need some improvement in the attitude of colleges towards student teaching. It should be placed on a sound footing and proper perspective with regards to curriculum and budgetary provisions made for the practice teaching.

The longer practice supervised by the school teachers would give the technique and confidence required by the prospective teachers. To ensure a degree of co-ordination selected school staff should be made incharge of supervising the student teaching and could be assigned some work in a teacher training institutions. In this way, they can know the college policy^{and} could be associated with the training of students for teaching and can give 'on the spot' advice. The college supervisor should also have his share of supervision.

Sometime can be allotted for the purpose. This can link theory with practice and the feed back can be maintained.

Ultimately, it becomes quite important for the student teachers to have faith in the efficiency and impact of teaching methods learnt by them. Stratemeyer and Lindsey say that "Successfully inducing a young person into teaching demands attitudes and

abilities in addition to those required for effective teaching of boys and girls.⁵

5. Opt. cit. p. 13.

CHAPTER III

Attitude and Their Measurement

The concept of attitude has been understood and defined differently. According to Thurstone and Chave an attitude is "The sum total of a man's inclination and feelings, prejudice or bias, preconceived notions, ideas, fears, threats and convictions about any specific topic"¹. It is otherwise stated by Thurstone as a "Generalized reaction for or against a specific psychological object".² Allport prefers to treat it as "A mental and neural state of readiness organized through experience, exerting a directive and dynamic influence upon the individual's response to all objects and situations with which it is related".³ This definition focusses attention upon attitude as a generalized pattern in perception or action as an integration of various experiences. Jordan defines attitude "An enduring set or disposition growing out of our experience to act favourably or unfavourably towards institutions, ideas, individuals or objects".⁴

Historically the concept of attitude included mental set, task set, and intention-determining tendencies of very brief duration-as well as the relatively permanent biases of politics, economics and religion. By Custom, however, "The concept has become restricted to mean social attitudes - long lasting pre-dispositions to perceive social situations in a certain manner

1. Thurstone and Chave: The Measurement of Attitude. p.6.

2. Thurstone L.L.: Theory of Attitude Measurement.

3. Munroe, Ed. Encyclopaedia of Educational Research. p.77.

4. ^{Ibid} Opt / out. p.77.

and to act accordingly."⁵

"On a psychological scale, attitude occupies a location between concept and trait. Concepts are generalized patterns evolved through experience, but they lack the dynamic quality of attitudes. ... Traits are likewise generalized patterns of perception and response, but their reference is primarily to the self e.g. self confidence, whereas attitudes have reference to the events outside the boundaries of self."⁶

Some of the leading characteristics of attitude have been expressed in the words of Jordan⁷ as follows:

1. An attitude is essentially a set or disposition which is also described as a predisposition or tendency.
2. There is always a feeling tone to act favourably or unfavourably, positively or negatively toward an object.
3. The attitude is a result of experience.
4. The set or disposition is directed towards some psychological objects such as a person, a situation, an institution, a race, or an ideal.
5. It is enduring.

Measurement of Attitude:

Necessity: It is thought that measurement of attitude is indispensable because of their great importance in man's life. On this very topic the opinions of prominent psychologists are worth considering.

5. Ibid. p.77

6. Ibid. p.77

7. Jordan A.M.: Measurement in Education. p.447.

Jordan⁸ writes "Attitudes and Interests determine pretty largely the direction of behaviour. Even more than knowledge, attitudes affects action."

Role of attitude in human life will be further known from what Ross Stoger writes on Attitude.

"The predominant role of attitudes in determining our though memory and learning processes has been recognized by psychologists since the late 19th century. Today it is agreed upon that attitudes not only determine the conclusions we shall derive from facts, but also influence the very facts we are writing to accept"⁹.

He further explains his point thus "It is easy to observe that students with attitudes infavourable to certain material learn it with greater difficulty than those whose attitudes are favourable. Experimentally Levin and Murphy showed that when students are grouped by pro and anti communists' attitude, they differ significantly in speed of memorizing passages praising or criticizing communism. Edward verified the hypothesis that people select and remember from a speech those items which fit their attitude, rejecting data which conflict with their views. Attitudes are therefore basic to many educational activities.

In the light of this vital importance, it is felt that attitudes should be measured for the purpose of knowing the pupils attitudes and develop or change them through the medium of education, as the need may arise. Measurement may surely help us in this

8. Supra p. ~~27~~ 21.

9. opt. cit. p ~~27~~ 20.

direction.

Methods of Attitude Measurement

For measuring anything some scale is necessary. Similarly for measuring attitude a scale should be prepared for measurement. In the beginning, the investigator collects a large number of items connected with the attitude under investigation. These items should show clearly favourable or clearly unfavourable views regarding something, idea or object. Secondly these items are administered to a group of subjects representative of the population under study and with whom the scale will be used. The subject is asked to indicate their responses by showing the agreement-disagreement with each item. These items are scored in such a way that response indicating the most favourable attitude is given the highest score. Each individual's total score is to determine which of the items discriminate most clearly between the high scores and the low scores on the total scale. Items that do not show substantial correlation with the total score are eliminated to ensure that the tool has internal consistency and that every item is related to the same general attitude. This is, in brief, the description of the Likert type of scale used in the measurement of attitude. It has many advantages over the Thurston Scale. They are:

1. It permits the use of items that are not manifestly related to the attitude being investigated.
2. In the Likert Method any item that is found to be empirically consistent with the total score can be included.

3. It is simpler and easy to construct.
4. It is more reliable as compared to the Thurstone type of scale having the same number of items.
5. It permits the expression of the several degrees of agreement-disagreement over an issue.
6. More precise information can be measured from the Likert type of scale.

Disadvantages of the Likert type of Scale

1. It does not provide basis for saying how much more favourable one is than another and also can not measure the amount of change after some experience.
2. The total score of an individual has little clear meaning since many patterns of responses to many items may give the same score. In this way, a greater number of response possibilities is provided. Although the total scores are the same, their meanings may be quite different.

Procedure of the Study

Procedure adopted by the investigator consists in preparing an attitude scale to know the teacher educators' attitude towards practice teaching. A few sentences about the selection of the sample size would not be out of place to mention here. The total number of teacher educators in U.P. and Delhi is estimated to be roughly about 500. Out of this number we can exclude 100 teachers who take up such subjects as arts, crafts, physical education etc. So ultimately 400 teacher educators remain who are mostly concerned with the practice teaching aspect of the training programme. In the present study only a limited sample

of 100 teacher educators working in Government Training Colleges, University Departments of Education and affiliated colleges having departments of education have been included. The sample has been drawn from various types of institutions undertaking the teacher training programme, so that it can be justified as representative and randomly stratified. It is drawn from the entire population of teacher educators in U.P. and Delhi regions. The method of study applied is the application of attitude scale prepared. A five point scale to measure the attitude, on the lines of Likert's technique was developed by the investigator. The investigator first studied the various constituent elements of practice teaching. He collected the opinions and statements concerning these various constituents. For this he asked the experts, experienced teacher educators to express their views on the subject. The literature dealing with the education of teachers was also consulted to frame the related items. In this ^{way} the investigator collected some sixty items related with the practice teaching. The items included in the opinionnaire (prepared at the first stage of the attitude scale) covered the following important ingredients of practice teaching:

1. Lesson Planning
2. Demonstration lessons
3. Observation of the lessons
4. Supervision of the lessons
5. Arrangement of the practice teaching
6. The place of internal assessment and external exams.
7. Evaluation of practice teaching

8. Methods adopted in teaching and their relationship with theory courses
9. The number of lessons to be taught
10. Self evaluation by the trainees
11. The role of the school teacher
12. The role of the college supervisor
13. Placement of the trainees in the profession after the training

In all 60 items were framed relating to the above mentioned aspects of practice teaching and a five point rating scale was put up against each statement. The positive and negative statements were mixed up. Preceding these statements a personal request was made in writing to each teacher educator and instructions were given to respond to the questionnaire. The tool was administered to a group of teacher educators for the try out. In this try out, 40 teachers educators were covered.

Scoring the Test Items:

The Likert's technique of attitude measurement gives each positions, on the given continuum, a scale value. Since it is a five point scale the weightage assigned to each positive or negative statement is as follows:

Categories	Weightage for positive statement	Weightage for negative statement
Strongly Agree	5	1
Agree	4	2
Undecided	3	3
Disagree	2	4
Strongly Disagree	1	5

The scoring of each statement was done according to their respective scale value. The scoring for all the statements (60) was added up to secure individual total score. The scores of all the 40 teacher educators was calculated in this way. All the scores were arranged in the descending order. The scripts representing 27% of the top scores and 27% of the bottom scores were considered. These scripts were 20 in number with 10 indicating the upper 27% and the rest 10 indicating the lower 27% of the total score. The total score of each item was calculated by finding its frequency in the corresponding scale value. Thus the score values for the 60 items were obtained. This followed the method of item analysis for the selection of items for the finalization of the tool. The number of individual scores in each group was 10. The frequencies for a particular statement under three categories of the scale (Agree, Undecided and Disagree) were recorded against each group in a tabular form. These are called as observed frequencies (f_o). In order to calculate the chi-square, in addition to the observed frequencies, expected frequencies (f_e) are also needed. Hence these were calculated with the help of the total frequencies under each category as well as against each group. The method of calculating the expected frequencies is to find out the difference between the observed and expected frequency and then square it and divide it by the expected frequency in each case. The sum of the quotients would be the value of the chi-square. The formula applied is like this:

$$\chi^2 = \sum \frac{(f_o - f_e)^2}{f_e}$$

$$\begin{aligned}
 df &= (r-1) (c-1) \\
 &= (2-1) (3-1) \\
 &= 2
 \end{aligned}$$

For 2 degree of freedom the value of chi-square at .05 level of significance is 5.991 and at .01 level is 9.210.

Similarly the chi-square for each item was calculated. The following table shows the value of the chi-square for each item and its level of significance.

Table 1

Item No.	Chi-square Value	Level of Significance
1	7.0	.05
2	4.0	-
3	4.0	-
4	4.0	-
5	21.0	.01
6	7.0	.05
7	4.0	-
8	1.0	-
9	1.0	-
10	1.0	-
11	7.0	.05
12	13.0	.01
13	1.0	-
14	4.0	-

Item No.	Chi-square Value	Level of Significance
15	3.0	-
16	4.0	-
17	4.0	-
18	4.0	-
19	47.0	.01
20	3.0	-
21	3.0	-
22	19.0	.01
23	1.0	-
24	3.0	-
25	12.0	.01
26	1.0	-
27	3.0	-
28	19.0	.01
29	1.0	-
30	7.0	.05
31	13.0	.01
32	3.0	-
33	1.0	-
34	1.0	-
35	16.0	.01
36	4.0	-
37	7.0	-
38	1.0	-

Item No.	Chi-square Value	Level of Significance
39	9.0	.05
40	1.0	-
41	1.0	-
42	1.0	-
43	7.0	-
44	4.0	-
45	1.0	-
46	13.0	.01
47	1.0	-
48	28.0	.01
49	9.0	.05
50	1.0	-
51	7.0	.05
52	9.0	.05
53	1.0	-
54	7.0	.05
55	3.0	-
56	1.0	-
57	1.0	-
58	31.0	.01
59	36.0	.01
60	25.0	.01

It can be seen from the ~~above~~ table that 24 items out of 60 items stand statistically significant. The list of these items is given in Appendix II.

In this way 24 items were retained and the rest eliminated. For the final analysis and interpretation these items were considered. Of these 18 were positive and 6 negative statements and their scoring for the 100 respondents was done as per method already referred to in the previous pages.

Reliability of the Attitude Scale

The reliability concerns with the precision of the tool regardless of what is measured. The split-half reliability coefficient often tends to be lower in attitude research. It is generally lower than the test-retest coefficient and in any case as Vernon (10) points out "It is probably a mistake to aim ~~xx~~ at extremely high reliability in attitude scales, since this may be obtained at the expense of validity".

The investigator adopted the Croanbach Alfa method of estimating the reliability of the test. This method makes use of the item statistics and is a measure of internal consistency of the test.

The following formula gives the reliability of a test:

$$\alpha = \frac{n}{n-1} \left(1 - \frac{v_i}{v_t} \right)$$

Where n = number of items

v_i = the sum of variance on all items

v_t = total variance

In this case the reliability is calculated as follows:

$$r = \frac{24}{24-1} \left(1 - \frac{45858}{95950} \right)$$

$$r = \frac{24}{23} (1 - .47)$$

$$r = \frac{24}{23} (.53) = 0.55$$

Hence the reliability coefficient of the attitude scale is 0.55 in the present investigation.

Validity:

Attitudes are pre-dispositions which we become aware through behaviour but when the nature of attitude is not known, precisely understood, and the behaviour to which it gives rise may be distorted for reasons of courtesy and expediency, it makes it difficult to establish the validity of any particular attitude scale. Moreover, assessment of validity is ultimately a subjective one. It seems, therefore, feasible to measure attitude as an index of attitude and then define the, attitude as 'What the test measures'. The validity of a test must inhere in its construction and must inevitably be based on a subjective assessment of its various items in relation to a logical analysis of the trait in question, as it exists in investigator's perception. Thus Mc Nemar (11) has pointed out that "A scale of attitude towards an issue is said to be valid because the items in the scale make it so that the items have been judged valid". On this assumption one can reasonably be satisfied

11. Mc Nemar, Q. Opinion-Attitude Methodology, Psychological Bulletin, 1946. pp. 43, 289, 374.

that he has produced a valid instrument. Remmers (12) has in fact suggested that "If we are interested only in knowing what the present attitudes of a given group are, we can equate validity with reliability".

Further it has been repeatedly pointed out that it is difficult to establish the validity. Regarding validity Croanbach writes "Attitude tests have been severely criticised because they have been used without their validity having been established. The failure to demonstrate that they are valid measure of belief is in the part due to the difficulty of finding criteria".(13)

Freeman is also of the same opinion "Validity of tests of attitude is extremely difficult to determine in a statistical manner since the only behavioural data of sampling with regard to such measure attitudes towards church, foreign forms, specific minority groups, education and the like". (14)

Therefore it is very difficult to know a man's attitude except what he tells us. His attitudes and private beliefs can be inferred through his publicly verbalized opinion. Since the individual is expected to express his free opinion regarding statements in the attitude scale, it is believed that his opinions indicate his attitude. To that extent the attitude scale has a high validity.

12. Remmers, H.H. Introduction to Opinion and Attitude Measurement, Harper & Brothers, New York 1954, p.47.

13. Croanbach Lee, J. Essentials of Psychological Testing, Harper & Brothers, New York 1949, p. 375.

14. Freeman, Frank, S. Theory and Practice of Psychological Testing, Henry Holt and Company, New York, 1956, p. 488.

CHAPTER IV

Analysis and Interpretation of Data

After having collected the data with the help of the final attitude questionnaire, the next step pursued by the investigator was that of making an analysis of the data and interpreting the results arrived at, on the basis of the analysis.

First of all the investigator scored the 100 questionnaires responded by the teacher educators. The following table shows the scores of the individuals on the final attitude scale.

Table 2

S1. No.	Score	S1. No.	Score
1	75	15	74
2	70	16	68
3	82	17	93
4	86	18	91
5	77	19	80
6	83	20	82
7	71	21	88
8	66	22	81
9	84	23	76
10	78	24	79
11	92	25	64
12	89	26	72
13	79	27	71
14	78	28	79

Sl. No.	Score	Sl. No.	Score
29	76	52	76
30	64	53	79
31	73	54	70
32	84	55	80
33	72	56	73
34	84	57	73
35	78	58	75
36	72	59	86
37	90	60	85
38	80	61	84
39	80	62	74
40	69	63	104
41	74	64	81
42	72	65	81
43	78	66	87
44	68	67	71
45	85	68	94
46	83	69	88
47	81	70	74
48	77	71	81
49	75	72	82
50	83	73	77
51	79	74	68

Sl. No.	Score	Sl. No.	Score
75	73	88	84
76	86	89	75
77	85	90	85
78	83	91	81
79	81	92	79
80	74	93	91
81	82	94	77
82	83	95	88
83	77	96	83
84	77	97	80
85	80	98	68
86	81	99	80
87	87	100	86

The Mean and S.D. of the scores were calculated by the formulae I. $M = \frac{\Sigma X}{N}$ Where $X = 7924$; $N = 100$

$$\text{II. S.D.} = \sqrt{\frac{(\Sigma d^2)}{N} - \left(\frac{\Sigma d}{N}\right)^2}$$

d = difference between the Assumed Mean and the Score

N = Number of individuals.

$$\begin{aligned} \text{S.D.} &= \sqrt{\frac{4730}{100} - \left(\frac{-78}{100}\right)^2} \\ &= \sqrt{47.30 - (-.78)^2} = \sqrt{46.30} = 6.81 \end{aligned}$$

$$M = 79.24$$

$$\sigma = 6.81$$

This shows that the mean score on the attitude questionnaire is more than the neutral point ($24 \times 3 = 72$) where the individual show neither a positive attitude nor a negative attitude. Hence it can be interpreted that the group of respondents is showing a positive or favourable attitude towards practice teaching.

The next step was to analyse the data to investigate that experience, qualifications and the type of institutions have some bearing on the attitude of the individuals who are working as teacher educators. All the 100 respondents were categorised according to the years of teaching experience which they have to their credit. The following break up will show the position.

Experience	No. of Teacher Educators
5 years or Below	33
Between 6 & 10 years	30
Between 11 & 15 yeras	24
16 years or Above	13

$$N = 100$$

Thus four groups were made according to the number of years of teaching experience. The mean score and S.D. for individuals of each group were calculated was shown in table 3.0.

Contd...

Table 3.0
Means and S.Ds. of Scores Obtained by Teacher
Educators (Experiencewise)

Particulars	Group I	Group II	Group III	Group IV
Means	80.90	76.53	80.58	79.38
S.Ds.	8.90	5.19	4.63	6.83
Number of Individuals	33	30	24	13

The above table shows that there is a difference between the means of four groups. To test whether this difference, between the groups, is statistically significant or not the 't' test was applied with the formula

$$t = \frac{M_1 - M_2}{\sqrt{\frac{\sigma_1^2}{N_1} + \frac{\sigma_2^2}{N_2}}}$$

$$df = N_1 + N_2 - 2$$

Where M_1 = Mean of the first group

M_2 = Mean of the Second group

σ_1^2 = Variance of the first group

σ_2^2 = Variance of the second group

N_1 = Number of individuals in the first group

N_2 = Number of individuals in the second group

The following table shows the relationship (t value) between different groups:

Table 3.1

t-values Between the Means for Different Group

Particulars	't' Value	Level of Significance
Between Group I & II	1.30	NS*
Between Group II & III	3.04	.05
Between Group III & IV	0.56	NS
Between Group I & III	0.17	NS
Between Group I & IV	0.21	NS
Between Group II & IV	1.35	NS

* Not significant.

From the above 't' values it can be interpreted that there is significant difference between the Means of Groups II & III. Hence there is some difference in attitude of persons belonging to these two groups.

Further to see whether these ~~f~~four groups were significantly different from each other or not, the analysis of variance was done. The following table shows the results obtained therein.

Table 3.2

Summary-Analysis of Variance-Experiencewise

Source of Variation	df	S.S.	M.S.	F
Between Groups	3	345.9678	115.3226	2.149*
Within Groups	96	5151.7922	53.6645	
Total	99	5497.7600	-	

*Not significant at .05 level.

The F is not significant at .05 level of confidence. Hence it can be interpreted that there is no significant difference between these four groups, on the whole.

Then the investigator tried to see the bearing of qualifications on attitude. All the 100 respondents were categorized into three groups as shown here:

Qualifications of Teacher Educators	Number of Respondents
B.Ed./B.T./L.T.	18
M.Ed.	67
Ph.D.	15

The Mean Score and S.D. for individuals of each group were calculated as shown below:

Table 4.0
Mean and S.Ds. of Scores obtained by
Teacher Educators - Qualification

Particulars	Group I	Group II	Group III
Means	78.33	78.68	82.46
S.Ds.	6.05	6.73	8.22
Number of Individuals	18	67	15

The above table shows that there is difference between the three means. The 't' test has been applied to see the difference.

The following table shows the relationship ('t' value) between different groups:

Table 4.1

't' Values Between the Means of Different Groups - Qualification-wise

Particulars	't' Value	Level of Significance
Between Group I & II	0.22	NS*
Between Group II & III	1.66	NS
Between Group I & III	1.62	NS

* Not significant.

Since none of the 't' values is significant so it can be interpreted that any two groups, though having different qualifications, are not significantly different from each other as regards their attitude.

Further to see whether these three groups were significantly different from each other, the analysis of variance was done.

Table 4. 2

Summary - Analysis of Variance - Qualificationwise

Source of Variation	df	S.S.	M.S.	F
Between Groups	2	175.1943	87.5971	1.805*
Within Groups	97	4706.5957	48.5216	
Total	99	4881.7900	-	

* Not significant at .05 level.

The next step in the analysis of the data was to calculate the Mean Score and S.D. for individuals belonging to the three groups made on the basis of the types of institutions to which they belonged. The group formation will be clear from the following:

Teacher Educators working in:	Number of Respondents
Versity Department of Education	32
Affiliated Private Colleges	48
Govt. Training Colleges	20

Table 5.0
Means and S.D.s of Scores of each Group -
Types of Institutions

Sl. No.	Particulars	Group I	Group II	Group III
1	Means	78.78	78.83	77.45
2	S.Ds.	6.39	7.18	5.52
3.	No. of Individuals	32	48	20

There is a difference between the above means.

The application of 't' test shows the following results regarding indifference of Means.

Table 5.1

t-value for Indifference of Means for different Groups

Sl. No.	Particulars	The Value of 't'	Level of Significance
1	Between Group I & II	0.33	NS*
2	Between Group II & III	0.86	NS
3	Between Group I & III	0.20	NS

* Not Significant

It shows that the difference between the means of any two groups is not significant. It can be interpreted that the types of institutions have got no bearing upon the individual's attitude towards practice teaching.

To see the difference between the three groups taken as a whole, the analysis of variance was done as shown in the table below.

Table 5.2

Summary of Analysis of Variance - Type of Institutionwise

Source of Variation	df	S.S.	M.S.	F
Between Groups	2	116.8546	58.4273	1.202*
Within Groups	97	4713.5854	48.5937	
Total	99	4830.4400	-	

* Not significant at .05 level.

The F is not significant. Hence it can be interpreted that the type of institution to which the individuals belong make no difference in their attitude towards practice teaching.

CHAPTER V

Conclusions and Suggestions

The present chapter contains the findings of the study of teacher educators' attitude towards practice teaching. The analysis of the data revealed the following conclusions:

1. The attitude scale prepared by the investigator has a reliability coefficient of 0.55.

2. The mean score of all the 100 respondents on this attitude scale is 79.74. Since the score of 72 indicates a neutral attitude, it can be inferred that those who have secured a mean score of 79.74 on this scale show a positive attitude. In the present investigation the teacher educators show a favourable attitude towards practice teaching.

3. Difference in the number of years of experience does not bring any change in the attitude as shown with the help of of the analysis of the variance; though there is significant difference between the mean scores of Group II & III made on the basis of experience. In the present study it can be said that those who belong to the III group have more favourable attitude towards practice teaching, On the whole there is no significant difference among the four groups.

4. Qualification has no bearing on the attitude. Teacher educators having different qualifications such as B.T./B.Ed. or M.Ed. or Ph.D. are in no way different from each other as regards their attitude towards practice teaching.

5. Difference in the types of institutions to which the teacher educators belonged does not have any influence on their

attitude. So it can be inferred that the attitude is independent of the institutional set-up to which the different teacher educators belonged.

Suggestions for Further Research

On the basis of these conclusions reached by the investigator, the following suggestions are extended for further research and other reforms in the teacher education.

1. The scale prepared by the investigator has a reliability of 0.55. So it can be used over a large population of teacher educators belonging to the different parts of the country.

2. The attitude of teacher educators towards other aspects of teacher education such as theoretical courses, teachers role etc. can be studied.

3. The difference in the attitude can also be studied in relation to such variables as rural-urban, age, sex etc.

4. The same study of attitude can also be done in case of primary school teacher educators.

5. Ways and means can be devised to make this attitude more favourable so that improvement in teacher education may be possible.

6. Evaluation system in teacher education can be improved if the attitude of teacher educators can be made favourable. The relationship between the two can be investigated and steps may be taken accordingly.

BIBLIOGRAPHY

Books

1. Croanbach Lee, J. Essential of Psychological Testing, Harper & Brothers, New York, 1949.
2. Edward, A.L. Techniques of Attitude Scale Construction, Appleton Century Crafts, Inc. New York, 1957.
3. Freeman Frank S. Theory and Practice of Psychological Testing Henry Holt & Company, New York, 1956.
4. Ferguson, G.A. Statistical Analysis in Psychology and Education, McGraw Hill, New York, 1959.
5. Gurrey, P. Education and the Training of Teachers Longmans, London, 1963.
6. Mukerji, S.N. (Ed.) Education of Teachers in India, Vol.I & II, S. Chand & Co. New Delhi, 1968.
7. Munrol, (Ed.) Encyclopaedia of Educational Research, Macmillan & Co. New York, 1960.
8. Robert, W. Pyle. Some Aspects of Education in New York N.C.E.R.T. New Delhi, 1967.
9. Remmers, H.H. Introduction to Opinion and Attitude Measurement Harper and Brothers, New York, 1954.
10. Vernon, P.E. Personality Tests and Asscessments, Methuen, London, 1961.
11. Walker, H.M. and Lev. Joseph. Statistical Inference Rinehart & Wilson, New York, 1953.
12. Woodruff, Asahel D. Student Teaching Today, The American Association of Colleges for Teacher Education, Washington D.C., 1960.

Reports

1. All India Association of Training Colleges, "Report of the Study Group on the Education of Secondary Teachers in India" New Delhi, 1964.
2. Education Commission, "Recommendation of Teacher Education and Teacher Status". New Delhi; Ministry of Education, Govt. of India, 1965.
3. Ministry of Education, Govt. of India, Report of the Indian Education Commission, 1964-66.

4. Department of Teacher Education, NCERT, 33, Chhatra Marg, Delhi-7, "Report of the All India Preparatory Seminar on Student Teaching".

Journals

1. "Indiana State University Teachers College Journal" Indiana U.S.A., Vol. 39, October 1967.
2. The British Journal of Educational Psychology, Vol. XXII, October, 1953, London.
3. The British Journal of Educational Psychology, Vol. XXV, November, 1965.
4. The Journal of Educational Research, The National Educational Association, Vol. 60, No.4; December 1966.
5. Teacher Education, DEPSE, New Delhi.

National Institute of Education
LIBRARY

Acc. No.....

Date.....

SUMMARY

AN INVESTIGATION INTO THE TEACHER EDUCATORS ATTITUDE TOWARDS PRACTICE TEACHING IN SOME OF THE SELECTED TRAINING COLLEGES OF U.P. AND DELHI

Need for the Study:

Teacher education is considered as one of the most important segments of the entire educational field. Upon the quality of teachers depends considerably the standards of education. Practice teaching occupies a major portion of training programmes for teachers. It is generally controlled by the teacher educators and very insignificantly by the school teacher in our country. The investigator thought to study the attitude of teacher educators towards practice teaching because it is the attitude which guide one's relationship with others and also the perception about the object in view. Improvements are possible if teacher educators attitude is known towards practice teaching. Student teaching is assuming many dimensions because of the changing school and societal conditions out side. Teacher educators must view it with different angle so that adjustment is possible with new conditions. The investigator did not come across any attitudinal study related to practice teaching and thought it into the fitness of things to undertake this study so that some light can be thrown on the affairs of practice teaching in our training colleges.

Scope and Objectives of the Study:

The study is confined only to the teachers of selected training colleges in U.P. and Delhi. Again, it is restricted to measuring their attitude towards practice teaching. Only secondary

school teacher educators taking academic subjects such as English, Hindi, Science, Maths., Social Studies etc. have been included here. The following objectives were kept in view:

- 1) To find out in general the attitude of teacher educators towards practice teaching.
- 2) To ascertain whether teacher educators attitude towards practice teaching differs with their experience, qualifications and the type of institution to which they belong.

The Procedures and the Methods:

A five point attitude scale of Likert type has been developed to measure the attitude. Out of 60 statements collected, regarding practice teaching, only 24 have been retained. In the scale after statistical analysis for the selection of items by means of chi-square test. The attitude scale has been administered on a population of 196 teacher educators, of which 100 have returned the scale duly filled in. These 100 responses were analysed. This sample can be considered as representative because teachers from different type of institutions replied to the questionnaire. They were also having different qualification and the number of years of teaching experience to their credit. Out of the total estimated population of secondary school teacher educators which is roughly 500 this sample of 100 is quite representative. Moreover 100 teacher educators out of this 500 can be eliminated because they teach such subjects as art, craft, physical education and nursery education etc.

The Croanbach Alfa Method has been employed to establish the reliability of the scale. It is calculated as 0.55.

Analysis and Interpretation of Data:

The weightage for each item has been given from 5 to 1 along the continuum and vice versa according to the nature of the item i.e. positive and negative. The individual total score for 24 items indicate the attitude of teacher educators. The total score of 72 is a cut off point and the score above this point indicates a positive attitude and below it a negative attitude.

Further more, the individual total scores have been classified and analysed separately according to the teacher educator's qualification, experience and the type of institution to which they belong.

The Means and S.Ds have been calculated for each group formed on the basis of variables in the study. The 't' test and Analysis of Variance have been employed to test the significance of difference between means of any two groups taken at a time or more than two groups taken as a whole, respectively.

Main Findings of the Study:

i) The attitude of teacher educators in general towards practice teaching is favourable. change

ii) Experience of teaching does not bring/in attitude of teacher educators toward practice teaching; though in the present study it was observed that teacher educators having teaching experience between 6 to 10 years differ in attitude from those who have more than 10 years of teaching experience.

iii) There is no difference in attitude as a result of difference in qualifications of teacher educators.

iv) There is no difference in attitude as a result of difference in the type of institutions to which the teacher educators belong.

Suggestions for Further Study:

1. The scale can be used on a wider population.
2. It can be improved to obtain higher reliability.
3. Ways and means to improve the teacher educators' attitude towards practice teaching can be found out.
4. Attitude of teacher educators towards other aspect of teacher education can be studied.

APPENDIX

NATIONAL INSTITUTE OF EDUCATION
(National Council of Educational Research & Training)
13, NIE Hostel Mehrauli Road, New Delhi-16

V.P. Sharma
Associateship Course Student

March 20, 1968

Dear Sir/Madam

I venture to approach you for co-operation in the successful completion of my study on 'Teacher Educators' Attitude Towards Practice Teaching'. As you already know that practice teaching is considered as the backbone of any teacher education programme, hence it is necessary to know that how we, as teacher educators, perceive it and what attitude is generally held regarding the same.

Here is an attitude scale for recording the degree of your agreement/disagreement with each statement. You are requested to put a check (✓) to show your position on the given continuum. Do not leave out any statement even when you find it difficult to make up your mind. Your views will remain confidential. It would be appreciated much if you may send questionnaire filled in within ten days of the receipt of this.

Example:- Herbartian Steps are not to be necessarily followed by a student teacher.

- (a) Completely agree
- (b) Agree
- (c) Undecided
- (d) Disagree
- (e) Completely disagree

I earnestly hope to receive your fullest co-operation in this study.

Thanking you very much

Yours sincerely

Sd/-

(V.P. Sharma)

N.B:-Please use the attached self addressed stamped envelope for sending your reply.

-
- (1) Name
 - (2) Qualification
 - (3) Experience
 - (4) Institution

Completely Agree Undecided Disagree Completely Disagree

1. Lesson plans must be detailed and comprehensive.

A	B	C	D	E
---	---	---	---	---
2. Mental planning of a teacher is much helpful as compared to the written plans.

A	B	C	D	E
---	---	---	---	---
3. It is often found that the observation remarks of the supervisors do not relate significantly with the marks assigned by them to particular lessons.

A	B	C	D	E
---	---	---	---	---
4. After the conclusion of theoretical courses student teacher must take up practice teaching and finish the number of required lessons.

A	B	C	D	E
---	---	---	---	---
5. Almost all the supervision of practice teaching is to be done by the class room teacher.

A	B	C	D	E
---	---	---	---	---
6. The person evaluating the lesson must observe the whole lesson at all stages.

A	B	C	D	E
---	---	---	---	---
7. Student teachers are also capable of giving demonstrations lesson.

A	B	C	D	E
---	---	---	---	---
8. There is no need of criticism lesson because the main points of criticism are communicated by the supervisor after the lesson is over.

A	B	C	D	E
---	---	---	---	---

Completely Agree Undecided Disagree Completely Disagree

- | | A | B | C | D | E |
|--|---|---|---|---|---|
| 9. The cooperating teacher should suggest the topic of lessons depending upon the individual capacity of the student teachers. | A | B | C | D | E |
| 10. The collaboration of trainees and experienced teachers in the practising school, in the supervision of practice teaching is both desirable and valuable. | A | B | C | D | E |
| 11. Self evaluation by student teachers is not much helpful in improving practice teaching. | A | B | C | D | E |
| 12. Only during the course of practice teaching, demonstration lesson are useful to student teachers. | A | B | C | D | E |
| 13. Parent teacher association must be convinced about the usefulness of practice teaching. | A | B | C | D | E |
| 14. Continuous practice teaching followed by block teaching of two weeks is advantageous. | A | B | C | D | E |
| 15. The value of a criticism lesson for the teacher or for rest of the students, is doubtful. | A | B | C | D | E |
| 16. The number of lessons to be taught should be fixed for each trainee. | A | B | C | D | E |
| 17. A student teacher must be placed for practice teaching in a school where he/she is likely to take up the teaching job in future. | A | B | C | D | E |

Completely Agree Undecided Disagree Completely Disagree

- | | | | | | |
|---|---|---|---|---|---|
| 18. Student teacher waste a lot of time by way of formal teaching. | A | B | C | D | E |
| 19. With the help and co-operation of the Inspector of schools it is easy to seek the co-operation of the practising school. | A | B | C | D | E |
| 20. If the students can teach and also listen to the discussions on the principles of education they are likely to do well in their teaching. | A | B | C | D | E |
| 21. Condition under which criticism lesson is given is two artificial hence no useful purpose is served. | A | B | C | D | E |
| 22. The class room teacher is the best person to give the demonstration lesson. | A | B | C | D | E |
| 23. It is necessary to supervise all the lessons of all students. | A | B | C | D | E |
| 24. The part of practice teaching should be arranged in a school attached to college and the rest in unattached school. | A | B | C | D | E |
-

APPENDIX III

List of Institutions Covered under the Study

1. Central Institute of Education,
33, Chhatra Marg, Delhi-7.
2. Teachers College,
Jamia Millia Islamia,
New Delhi-25.
3. Central Pedagogical Institute,
Allahabad.
4. Govt. Women's Training College,
Allahabad.
5. K.P. Training College,
Allahabad.
6. K.R. Training College,
Mathura.
7. D.S. Teachers Training College,
Aligarh.
8. Barahseni College,
Aligarh.
9. D.A.V. Training College,
Kanpur.
10. D.A.V. Training College for Women,
Dehradun.
11. N.A.S. College,
Meerut.
12. Meerut College,
Meerut.
13. I.T. College,
Lucknow.
14. Department of Education,
Lucknow University,
Lucknow.
15. Department of Education,
Banaras Hindu University,
Varanasi.
16. Harish Chandra Degree College,
Varanasi.

17. Department of Education,
Gorakhpur University,
Gorakhpur.
18. Department of Education,
Muslim University,
Aligarh.
19. R.B.S. College of Education,
Agra.
20. Women's Training College,
Dyalbagh,
Agra.
21. Tilak Dhari College of Education,
Jaunpur.
22. Ganjdudwara College (B.Ed. Section)
Ganjdwara,
Etah.

APPENDIX IV
List of Tables

Table 1

Scores of Teacher Educators on the Attitude
Scale given for Try out

Sl. No.	Score	Sl. No.	Score
1	205	22	
2	208	23	218
3	207	24	209
4	230	25	186
5	203	26	230
6	221	27	191
7	213	28	211
8	195	29	216
9	229	30	197
10	208	31	193
11	229	32	221
12	230	33	215
13	204	34	216
14	205	35	203
15	203	36	206
16	203	37	226
17	228	38	220
18	209	39	212
19	224	40	203
20	211	41	201
21	215		

Table 2
Scores Arranged in the Descending
Order for Item Analysis

Sl. No.	Score	Sl. No.	Score
1	230	21	209
2	230	22	209
3	229	23	208
4	229	24	208
5	228	25	207
6	226	26	206
7	224	27	205
8	221	28	205
9	221	29	204
10	220	30	203
11	218	31	203
12	216	32	203
13	216	33	203
14	215	34	203
15	215	35	201
16	213	36	196
17	212	37	195
18	211	38	193
19	211	39	191
20	211	40	186

Table 3

Scores of Teacher Educators having
Five years or Below of Teaching
Experience

N = 33

Sl. No.	Score	Sl. No.	Score
1	65	18	66
2	79	19	86
3	70	20	92
4	73	21	84
5	36	22	89
6	85	23	70
7	79	24	75
8	91	25	78
9	88	26	80
10	68	27	84
11	74	28	79
12	104	29	84
13	87	30	93
14	82	31	64
15	86	32	91
16	68	33	76
17	74		

Table 4

Scores of Teacher Educators having 6 to 10
years of Teaching Experience

N = 30

Sl. No.	Score	Sl. No.	Score
1	78	16	77
2	83	17	77
3	81	18	80
4	75	19	82
5	73	20	71
6	75	21	78
7	75	22	64
8	77	23	72
9	80	24	73
10	86	25	72
11	84	26	79
12	71	27	82
13	81	28	71
14	73	29	74
15	85	30	68

Table 7

Scores of Teacher Educators having
B.T./B.Ed./L.T. as their professional
Qualification

N = 18

Sl. No.	Score
1	80
2	77
3	77
4	83
5	82
6	91
7	87
8	74
9	74
10	80
11	86
12	73
13	77
14	92
15	74
16	73
17	72
18	78

Table 8

Scores of Teacher Educators having M.Ed.
as their Professional Qualification

N = 67

Sl. No.	Score	Sl. No.	Score
1	74	18	79
2	83	19	81
3	85	20	90
4	86	21	75
5	73	22	84
6	68	23	87
7	77	24	81
8	81	25	75
9	71	26	73
10	81	27	80
11	84	28	70
12	85	29	79
13	86	30	76
14	68	31	75
15	83	32	77
16	88	33	81
17	91	34	83

Contd...:

Sl. No.	Score	Sl. No.	Score
35	85	52	64
36	68	53	76
37	72	54	84
38	78	55	84
39	75	56	72
40	71	57	91
41	70	58	93
42	82	59	76
43	89	60	79
44	83	61	72
45	84	62	79
46	86	63	82
47	66	64	74
48	80	65	78
49	81	66	71
50	69	67	78
51	80		

Table 9

Scores of Teacher Educators having Ph.D.
as their Professional Qualification

N = 15

Sl. No.	Score
1	82
2	81
3	84
4	88
5	104
6	80
7	77
8	79
9	83
10	78
11	79
12	88
13	90
14	80
15	64

Table 10

Scores of Teacher Educators belonging to
the University Departments of Education

N = 32

Sl. No.	Score	Sl. No.	Score
1	78	17	85
2	68	18	68
3	64	19	78
4	82	20	79
5	80	21	83
6	79	22	75
7	76	23	77
8	72	24	68
9	84	25	77
10	76	26	82
11	80	27	81
12	74	28	84
13	90	29	88
14	88	30	74
15	81	31	104
16	83	32	73

Table 11

Scores of Teacher Educators belonging to
the Affiliated Private College

N = 48

Sl. No.	Score	Sl. No.	Score
1	71	25	72
2	74	26	80
3	79	27	83
4	78	28	88
5	93	29	77
6	91	30	91
7	72	31	79
8	84	32	81
9	73	33	85
10	64	34	75
11	69	35	84
12	80	36	87
13	78	37	81
14	75	38	86
15	71	39	79
16	70	40	68
17	82	41	86
18	89	42	87
19	77	43	81
20	83	44	84
21	84	45	85
22	92	46	83
23	86	47	85
24	66	48	86

Table 12
Scores of Teacher Educators belonging to
Government Training Colleges
N = 20

Sl. No.	Score
1	72
2	81
3	79
4	75
5	73
6	73
7	80
8	70
9	76
10	80
11	81
12	71
13	74
14	77
15	77
16	80
17	83
18	82
19	74
20	91